

IAP11 Rec'd PCT/PTO 21 JUL 2006

Description

AQUEOUS DISPERSION TYPE POLYURETHANE COMPOSITION

Technical Field:

[0001]

5 This invention relates to an aqueous dispersion type polyurethane composition having a specific formulation. More particularly, it relates to an aqueous dispersion type polyurethane composition obtained essentially from a polycarbonate diol having an average molecular weight of 500 to 5000, a carboxyl-containing diol, a diisocyanate compound, a monoamine compound, and a carboxyl-neutralizing agent. The
10 composition provides a coating film with good adhesion to a substrate and provides impact resistance.

Background Art:

[0002]

Automotive coatings are usually multilayer systems applied to an electrocoated
15 panel, including an intercoat, a basecoat, and a topcoat. In recent years, waterborne systems for the intercoat and the basecoat have been investigated from the standpoint of the environmental burden and working hygiene. The intercoat is required to serve for preparation of surfaces to finally achieve high quality finish and also to have impact resistance influential on stone-chip resistance.

20 [0003]

To solve the above problems, use of an aqueous dispersion type composition as an intercoating composition has been studied. For example, Patent Document 1 discloses a waterborne coating containing a polyester emulsion and an aliphatic